Certain Changes in the Nomenclature of New Zealand Species of Gramineae.

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SOME few years ago I undertook the revision of the Gramineæ of New Zealand. Most of the ground work is now accomplished, and I hope to publish shortly those sections of the work that are completed. Much delay occurred through various causes in the past, and it now becomes increasingly urgent to publish changes of names which have taken, or should have taken place since the publication of Cheeseman's Manual of the New Zealand Flora (1925). There are also a number of groups whose identities were confused in the past. I shall avoid publishing new groups here. This matter, together with any discussions on the reason and manner of treatment, is reserved for consideration under the revision of the particular genera. In the following list, therefore, I merely bring to notice those departures from nomenclature adopted in Cheeseman's *Manual* that arise mainly out of the application of the International Rules of Botanical Nomenclature.

Agropyron enysii Kirk (1895, p. 352); *A. aristatum* (Petrie) Cheeseman (1914, t. 234) non Besser (1822, p. 41).

A. kirkii Zotov, nom. nov.; *A. multiflorum* (Banks et Solander ex Hooker) Kirk (1897, p. 530); non Palisot (1812, p. 102).

A.k. var. ***longisetum*** (Hackel ex Cheeseman) Zotov, comb. nov.; *A. multiflorum* var. *longisetum* Hackel ex Cheeseman (1906, p. 922).

Agrostis imbecilla Zotov, nom. nov.; *A. tenella* Petrie (1890, p. 442), non Schleich ex Gaudin (1811, p. 75).

A. perennans (Walter) Tuckerman (1843, p. 44); *Cornucopiae perennans* Walter (1788, p. 74); *A. parviflora* Brown (1810, p. 170).

Arundo kakaho Steudel (1855, p. 194); *A. conspicua* Forster (1786, p. 9) err. det. Hooker (1855, p. 299). Steudel's spelling of the specific name was *kakao,* repeating Richard's orthographical error of the Maori name, which is kakaho.

Genus COCKAYNEA Zotov, novum.

Elymi L. affinis. Inflorescentia racemiformis, diminuta, spicae similis. Spiculae solitariae, 1– vel ultra-florae. Glumae 2, perfectae, vel incohatae, persistentes, rhachide parallelae. Flosculi dorsiventrales rhachide radiales. Rhachilla extra flosculum producta. Lemma haud carinata, haud aristata vel in aristam producta. Palea nervis 2. Lodiculea 2, stamina 3, styli 2. Caryopsis adnata.

Type species: *Asperella laevis* Petrie.

Distribution: New Zealand, Tierra del Fuego.*

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* *Cockaynea elymoides* (Hackel ex Dusen) Zotov, comb. nov.; *Agropyron elymoides* Hackel ex Dusen, *Gefasspfl. Magellans. Svenska Exped. Magellans.* 3 (5): 232, 1900.

C. gracilis (Hooker) Zotov, comb. nov.; *Asperella gracilis* (Hooker) Kirk (1895, p. 352); *Gymnostichum gracile* Hooker (1855, p. 312, t. 70).

C. laevis (Petrie) Zotov, comb. nov.; *Asperella laevis* Petrie (1895, p. 406).

Danthonia flavescens Hooker (1864, p. 332); *D. raoulii* var. *flavescens* Hackel ex Cheeseman (1906, p. 886).

D. f. var. *hookerii* Zotov, comb. nov., nomen nov.; *Bromus antarcticus* Hooker (1844, p. 97, t. 54); *D. antarctica* (Hooker) Hooker (1855, p. 302) non (Thunberg) Sprengel (1825, p. 331).

D. f. var. *cheesemanii* (Hackel ex Cheeseman) Zotov, comb. nov.; *D. raoulii* var. *cheesemanii* Hackel ex Cheeseman (1906, p. 887).

D. f. var. *elata* (Petrie) Zotov, comb. nov.; *D. oreophylla* var. *elata* Petrie (1913, p. 274).

D. exigua (Kirk) Zotov, comb. nov.; *Triodia exigua* Kirk (1882, p. 378).

D. gracilis Hooker (1855, p. 303, t. 69B); *D. semiannularis* var. *gracilis* (Hooker) Hooker (1864, p. 333).

D. g. var. *nigricans* (Petrie) Zotov, comb. nov.; *D. semiannularis* var. *nigricans* Petrie (1914, p. 37).

D. kirkii Zotov, nom. nov.; *Triodia pumila* (Kirk) Hackel ex Cheeseman (1906, p. 896) non *D. pumila* Nees (1841, p. 343).

D. ovata Buchanan (1879, t. 29 [2]), *nomen dubium.*

D. penicillata (Labillardière) Palisot (1812, p. 92); *Arundo penicillata* Labillardière (1804, p. 26, t. 34); *D. pilosa* Brown (1810, p. 177).

D. petriei Zotov, nom. nov.; *Triodia australis* Petrie (1890, p. 442) non *D. australis* Buchanan (1879, t. 31).

D. p. var. *mucronulata* (Hackel ex Cheeseman) Zotov, comb. nov.; *Triodia australis* var. *mucronulata* Hackel ex Cheeseman (1906, p. 897).

D. petriei × *setifolia*; *D. nuda* Hooker (1855a p. 337); *D. nuda* × *semiannularis* Cockayne et Allan (1934, p. 11).

D. rigida Raoul (1844, p. 116); *D. raoulii* Steudel (1855, p. 246).

D. r. var. *teretifolia* (Petrie) Zotov, comb. nov.; *D. raoulii* var. *teretifolia* Petrie (1923, p. 571).

D. raoulii var. *rubra* Cockayne (1919, p. 4; etc.) *nomen nudum.*

D. semiannularis var. *unarede* (Raoul) Hooker (1855, p. 304); *D. unarede* Raoul (1844, p. 116).

D. setifolia (Hooker) Cockayne (1921, p. 146); *D. semiannularis* var. *setifolia* Hooker (1855, p. 304).

D. thomsoni Buchanan (1880, t. 36 [2]); *Triodia thomsoni* (Buchanan) Petrie (1912, p. 188).

D. thomsoni × *setifolia; D. buchanani* Hooker (1864, p. 333); *D. buchanani* × *semiannularis* Cockayne et Allan (1934, p. 11).

Deyeuxia crinita (Linné) Zotov, comb. nov.; *Dichelachne crinita* (Linné) Hooker (1855, p. 293), *Anthoxanthum crinitum* Linné (1781, p. 90).

D. conspicua (Forster) Zotov, comb. nov.; *Arundo conspicua* Forster (1786, p. 9), *Dichelachne sciurea* (Brown) Hooker (1855, p. 294).

D. filiformis (Forster) Hooker (1897, p. 268); *Avena filiformis* Forster (1786, p. 9), *D. forsteri* (Roemer et Schultes) Kunth (1829, p. 77).

D. f. var. ***pilosa*** (Cheeseman) Zotov, comb. nov.; *D. forsteri* var. *pilosa* Cheeseman (1906, p. 868).

D. f. var. ***aucklandica*** (Hooker) Zotov, comb. nov.; *Agrostis aucklandica* Hooker (1844, p. 96).

D. f. var ***humilior*** (Hackel ex Cheeseman) Zotov, comb. nov.; *D. forsteri* var. *humilior* Hackel ex Cheeseman (1906, p. 869).

D. f. var. ***leptostachya*** (Hooker) Zotov, comb. nov.; *Agrostis leptostachya* (Hooker (1844, p. 94).

D. f. var. ***littoralis*** (Hackel ex Cheeseman) Zotov, comb. nov.; *D. forsteri* var. *littoralis* Hackel ex Cheeseman (1906, p. 869).

D. f. var. ***lyallii*** (Hooker) Zotov, comb. nov.; *D. forsteri* var. *lyalli* (Hooker) Hackel ex Cheeseman (1906, p. 869).

D. f. var. ***micrathera*** (Hackel ex Cheeseman) Zotov, comb. nov.; *D. forsteri* var. *micrathera* Hackel ex Cheeseman (1906, p. 869).

D. f. var. ***semiglabrata*** (Hackel ex Cheeseman) Zotov, comb. nov.; *D. forsteri* var. *semiglabrata* Hackel ex Cheeseman (1906, p. 869).

D. f. var. ***striata*** (Colenso) Zotov, comb. nov.; *Agrostis striata* Colenso (1889, p. 107).

Festuca contracta Kirk (1895, p. 353); *F. erecta* D'Urville (1826, p. 601).

F. matthewsii (Hackel) Cheeseman (1925, p. 205); *F. petriei* Howarth (1928, p. 68).

F. rubra Linnaeus (1753, p. 74); *F. briquettii* Saint-Yves (1929, p. 74).

Hierochloe alpina (Swartz ex Willdenow) Roemer et Schultes (1817, p. 515); *Holcus alpinus* Swartz ex Willdenow (1805, p. 937). *Hierochloe fraseri* Hooker (1844, p. 93).

H. a. var. ***recurvata*** (Hackel ex Cheeseman) Zotov, comb. nov.; *H. fraseri* var. *recurvata* Hackel ex Cheeseman (1906, p. 856).

H. antarctica (Labillardière) Brown (1810, p. 209); *Disarrenum antarcticum* Labillardière (1806, p. 83, t. 232), *H. redolens* Brown ex Hooker (1844, p. 91).

H. a. var. ***brunonis*** (Hooker) Zotov, comb. nov.; *H. brunonis* Hooker (1844, p. 93, t. 52).

Microlaena avenacea var. ***carsei*** (Cheeseman) Zotov, comb. nov.; *M. carsei* Cheeseman (1915, p. 47).

Oryzopsis rigida (Richard) Zotov, comb. nov.; *Agrostis rigida* Richard (1832, p. 124), *Stipa arundinacea* (Hooker) Bentham (1881, p. 81).

Paspalum distichum Linnaeus (1759, p. 855); *Paspalum-digitaria* Poiret (1816, p. 316) err. det. Cheeseman (1906, p. 845; etc.).

P. vaginatum Swartz (1788, p. 21); *P. distichum* Linnaeus (1759, p. 855) err. det. Cheeseman (1906, p. 846; 1925, p. 139).

Genus PETRIELLA Zotov, novum.

Microlaenae R. Br. affinis. Inflorescentia paniculata. Spiculae pedicellatae, uniflorae. Glumae 2, persistentes. Lemmata sterilia 2, sine paleis. Lemma fertilie in aristam producta vel arista obsoleta.

Paleae fertiles 2–nervia. Rhachilla extra flosculum producta. Lodiculae 2, stamina 2. Caryopsis libera.

Type species: *Ehrharta colensoi* Hooker.

Distribution: New Zealand.

P. colensoi (Hooker) Zotov, comb. nov.; *Ehrharta colensoi* Hooker 1855, p. 288, t. 65A); *Microlaena colensoi* Petrie ex Cockayne et Laing (1911, p. 368), etc., *nomen nudum.*

P. thomsoni (Petrie) Zotov, comb. nov.; *Microlaena thomsoni* (Petrie) Petrie (1909, p. 472), *Ehrharta thomsoni* Petrie (1880, p. 356, t. 10).

Poa anceps var. *chathamica* (Petrie) Zotov, comb. nov.; *P. chathamica* Petrie (1902, p. 394).

P. a. var. *polyphylla* (Hackel) Zotov, comb. nov.; *P. polyphylla* Hackel (1903, p. 383).

P. astoni var. *oraria* (Petrie) Zotov, comb. nov.; *P. oraria* Petrie (1910, p. 196).

P. breviglumis Hooker (1844, p. 101); *P. imbecilla* var. *breviglumis* (Hooker) Cheeseman (1925, p. 201).

P. buchanani Zotov, nom. nov.; *P. sclerophylla* Berggren (1877, p. 30) non Kunth (1833, p. 340); *P. albida* Buchanan (1880, t. 50C) non Turczaninov ex Trinius, 1831, p. 387).

P. caespitosa Sprengel (1807–8, p. 302, t. 8); *P. caespitosa* Solander ex Forster (1786, p. 89), *nomen nudum.*

P. colensoi var. *guthrie-smithiana* (Petrie) Zotov, comb. nov.; *P. guthrie-smithiana* Petrie (1913, p. 275).

P. c. var. *intermedia* Cheeseman (1906, p. 908); *P. intermedia* Buchanan (1880, t. 48A) non Koeler (1802, p. 363).

P. imbecilla Sprengel (1807-8, p. 340); *P. imbecilla* Solander ex Forster (1786, p. 89), *nomen nudum.*

P. matthewsii Petrie (1902, p. 392); *P. imbecilla* var. *matthewsii* (Petrie) Hackel ex Cheeseman (1906, p. 913).

P. kirkii var. *aucklandica* (Petrie) Zotov, comb. nov.; *P. aucklandica* Petrie (1909, p. 478).

P. k. var. *campbellensis* (Petrie) Zotov, comb. nov.; *P. campbellensis* Petrie (1918, p. 211).

P. k. var. *cheesemanii* (Hackel) Zotov, comb. nov.; *P. cheesemanii* Hackel (1903, p. 383).

P. k. var. *dipsacea* (Petrie) Zotov, comb. nov.; *P. dipsacea* Petrie (1894, p. 271).

P. k. var. *incrassata* (Petrie) Zotov, comb. nov.; *P. incrassata* Petrie (1902, p. 394, et 1909, p. 479).

P. tennantiana Petrie (1909, p. 476); *P. foliosa* var. *tennantiana* (Petrie) Cheeseman (1925, p. 188).

P. triodioides (Trinius) Zotov, comb. nov.; *Arundo triodioides* Trinius (1836, t. 351), *Festuca littoralis* Labillardière (1804, p. 22, t. 27), non *Poa littoralis* Gouan (1762, p. 470).

Puccinellia spp.: see Allan and Jansen (1939, p. 265–269).

P. fasciculata var. *scott-thomsonii* (Allan et Jansen) Zotov, comb. nov.; *P. scott-thomsonii* Allan et Jansen (1939, p. 267).

Simplica laxa var. *buchananii* Zotov nom. nov. et comb. nov.; *Poa uniflora* Buchanan (1880, t. 49B) non Muhlenberg (1817, p. 151):

Stipa petriei Buchanan (1880, t. 17 [2]); *S. setacea* Brown (1810, p. 174) err. det. Kirk (1882, p. 386), etc.

Trisetum spicatum (Linnaeus) Richter (1890, p. 59); *T. subspicatum* (Linnaeus) Palisot (1812, p. 88).

T. kurtzii (Hackel) Zotov comb. nov.; *Koeleria kurtzii* Hackel (1900, p. 261).

Zoisia matrella (Linnaeus) Merrill (1912, p. 230); *Zoisia pungens* Willdenow (1801, p. 441).

Z. minima (Colenso) Zotov, comb. nov.; *Gaimardia minima* Colenso (1890, p. 491), *Zoysia pungens* Willdenow (1801, p. 441). *Z. pauciflora* Mez (1921, p. 145) p.p.

REFERENCES.

ALLAN, H. H. and JANSEN, P., 1939. *Trans. Roy. Soc. N.Z.*, vol. lxxii.

BENTHAM, G., 1881. *Journ. Linn. Soc. London*, vol. xix.

BERGGREN, S., 1877. *Physiograph. Saltskaps Minneskrift*, vol. viii.

BESSER, W. J. J., 1822. *Enumeratio Plantarum Volhyniae, Podoliae* . . . .

BROWN, R., 1810. *Prodromus Florae Novae Hollandiae.*

BUCHANAN, J., 1879. *The Indigenous Grasses of New Zealand*, tt. 22–40.

——— 1880. *The Indigenous Grasses of New Zealand*, tt. 41–58 and 17 (2), 26 (2), 36 (2).

CHEESEMAN, T. F., 1906. *Manual of the New Zealand Flora.*

——— 1914. *Illustrations of the New Zealand Flora*, vol. ii.

——— 1915. *Trans. N.Z. Inst.*, vol. xxxxvii.

——— 1925. *Manual of the New Zealand Flora*, ed. 2.

COCKAYNE, L., 1919. *N.Z. Journ. Agric.*, vol. xviii.

——— 1921. *N.Z. Journ. Agric.*, vol. xxiii.

——— and ALLAN, H. H., 1934. *Annals of Botany*, vol. xxxxviii.

——— and LAING, R. M., 1911. *Trans. N.Z. Inst.*, vol. xxxxiii.

COLENSO, W., 1889. *Trans. N.Z. Inst.*, vol. xxi.

——— 1890. *Trans. N.Z. Inst.*, vol. xxii.

FORSTER, G. (fil.), 1786. *Florulae Insularum Australium Prodromus.*

GAUDIN, —, 1811. *Agrostographia Helvetica*, vol. i.

GOUAN, A., 1762. *Flora Monspeliaca.*

HACKEL, E., 1900. *Bolet. Acad. Sci. de Cordoba*, vol. xvi.

——— 1903. *Trans. N.Z. Inst.*, vol. xxxv.

HOOKER, J. D. (fil.), 1844. *The Botany of the Antarctic Voyage 1839–1843, Flora Antarctica*, vol. i.

——— 1855. *The Botany . . . Flora Novae Zelandiae*, vol. i.

——— 1855a. *The Botany . . . Flora Novae Zelandiae*, vol. ii.

——— 1864. *Handbook of the New Zealand Flora.*

——— 1897. *Flora of British India*, vol. vii.

HOWARTH, W. O., 1928. *Journ. Linn. Soc., London, Botany*, vol. xxxxviii.

KIRK, T., 1882. *Trans. N.Z. Inst.*, vol. xiv.

——— 1895. *Trans. N.Z. Inst.*, vol. xxvii.

KUNTH, K. S., 1829. *Révision des Graminées . . .*, vol. i.

——— 1833. *Enumeratio plantarum omnium nucusque cognitarum*, vol. i. *Agrostographia sive enumeratio graminium.*

LABILLARDIERE, J. J. H. de, 1804. *Novae Hollandiae plantarum specimen*, vol. i.

——— 1806. *Novae Hollandiae plantarum specimen*, vol. ii.

LINNAEUS, C., 1753. *Species plantarum*.....

——— 1759. *Systema naturae . . .*, ed. x.

LINNE filio, C., 1781. *Supplementum plantarum, generum plantarum editiones sextae.*
MERRILL, E. D., 1912. *Phillipine Journ. Sci., Botany,* vol. vii.
MEZ, C., 1921. *Repertorium specierum regni vegetabilis,* vol. xvii.
MUHLENBERG, H. L., 1817. *Descr. Gram.*
NEES ab ESENBECK, C. G., 1841. *Flora Africa Australis.*
PALISOT de BEAUVOIS, A. M. F. J., 1812. *Essai d'une Nouvelle Agrostographie.*
POIRET, J. L. M., 1816. *Encyclopedia Methodique supplement* . . . iv.
PETRIE, D., 1880. *Trans. N.Z. Inst.,* vol. xii.
——— 1890. *Trans. N.Z. Inst.,* vol. xxii.
——— 1894. *Trans. N.Z. Inst.,* vol. xxvi.
——— 1895. *Trans. N.Z. Inst.,* vol. xxvii.
——— 1902. *Trans. N.Z. Inst.,* vol. xxxiv.
——— 1909. *The Subantarctic Islands of New Zealand,* vol. ii.
——— 1910. *Trans. N.Z. Inst.,* vol. xxxxii.
——— 1912. *Trans. N.Z. Inst.,* vol. xxxxiv.
——— 1913. *Trans. N.Z. Inst.,* vol. xxxxv.
——— 1914. *Trans. N.Z. Inst.,* vol. xxxxvi.
——— 1918. *Trans. N.Z. Inst.,* vol. l.
——— 1923. *Trans. N.Z. Inst.,* vol. liv.
RAOUL, E., 1844. *Annales des Sciences Naturelles,* vol. ii.
RICHARD, A., 1832. *Voyage de L'Astrolabe,* vol. vii. *Essai d'une Flora de la Nouvelle Zelande.*
RICHTER, C., 1890. *Pl. Europ.,* vol. i.
ROEMER, J. J. et SCHULTES, J. A., 1817. *Systema Vegetabilium* . . ., vol. ii.
SAINT-YVES, A., 1929 *Candollea,* vol. iv.
SPRENGEL, K., 1807-8. *Mém. de l'Acad. Imp. des Sci., St. Pétersbourg,* vol. ii.
——— 1825. *Systema vegetabilium,* vol. i.
STEUDEL, E. G., 1855. *Synopsis plantarum glumacearum,* vol. i. *Synopsis plantarum graminearum.*
SWARTZ, O., 1788. *Prodromus Descriptionum Vegetabilium Indiae Occidentalis.*
TRINIUS, C. B., 1831. *Mém. de l'Acad. Imp. des Sci., St. Pétersbourg,* ser. 6, vol. i.
——— 1836. *Species Graminum.*
TUCKERMAN, E., 1843. *Amer. Journ. Sci.,* vol. xxxxv.
URVILLE, D. D', 1826. *Mém. Soc. Linn. de Paris,* vol. iv.
WALTER, T., 1788. *Flora Caroliniana.*
WILLDENOW, C. L., 1801. *Neuen Schrift. des Berlin. Gesel. Naturforsch. Freunde,* vol. iii.
——— 1805. *Caroli a Linné species plantarum* . . ., vol. iv.